

011493146 **Image available**

WPI Acc No: 1997-471059/199743

Non-contact data exchange with electronic ticket - has antenna embedded in ticket and has complementary antenna coils on either side of 'V'-shaped guide that ensures ticket is placed within acceptable range

Patent Assignee: GEMPLUS SCA (GEMP-N); GEMPLUS (GEMP-N)

Inventor: KALINOWSKI R; LEDUC M; MARTIN P

Number of Countries: 023 Number of Patents: 003

Patent Family:

Patent No	Kind	Date	Applicat No	Kind	Date	Week
WO 9734249	A1	19970918	WO 97FR429	A	19970311	199743 B
FR 2745928	A1	19970912	FR 963044	A	19960311	199744
ZA 9703852	A	19980225	ZA 973852	A	19970505	199813 N

Priority Applications (No Type Date): FR 963044 A 19960311; ZA 973852 A 19970505

Cited Patents: EP 541323; GB 2177528; GB 2182793; US 4720626

Patent Details:

Patent No	Kind	Lan	Pg	Main IPC	Filing Notes
-----------	------	-----	----	----------	--------------

WO 9734249	A1	F	23	G06K-007/08	
------------	----	---	----	-------------	--

Designated States (National): CA CN JP SG US

Designated States (Regional): AT BE CH DE DK ES FI FR GB GR IE IT LU MC NL PT SE

ZA 9703852	A	21	G06K-000/00
------------	---	----	-------------

FR 2745928	A1	G06K-019/07
------------	----	-------------

Abstract (Basic): WO 9734249 A

The non-contact data exchange occurs between a ticket and a fixed reader. The ticket carries an embedded antenna (61). The reader has a 'V'-shaped guide (10) for the ticket as it is passed through. The reader antenna (20) is formed on the walls of the guide, having two interconnected coils (21,22), one on either wall.

These coils are formed by etching out zones of a metal film previously deposited on a flexible plastic sheet. A yoke of a magnetic material can be placed under the guide, with its poles adjacent to the two coils.

ADVANTAGE - Allows use of small antenna in ticket, reducing fabrication cost, while giving good coupling to permit greater tolerance of position of ticket relative to reader. Fast and accurate communication.

Dwg. 1/5

Derwent Class: T04; T05; V02; W02; W06

I